

SEQUENCE LISTING

<110> Sogabe, Atsushi
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 Hatta, Takashi
 Nishise, Hiroshi

<120> NOVEL GLYCEROL KINASE, GENE THEREOF AND
 METHOD FOR PRODUCING THE GLYCEROL KINASE USING THE GENE

<130> 18965-002US1

<140> 10/527,370

<141> 2005-03-10

<150> PCT/JP2003/11411

<151> 2003-09-08

<150> JP 2002-264466

<151> 2002-09-10

<160> 6

<170> FastSEQ for Windows Version 4.0

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<211> 505

<212> PRT

<213> Cellulomonas sp. JCM2471

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Glu	His	Asp	Gln	Ile	Phe	Pro	Arg	Ala	Gly	Trp	Val	Glu	His	Asn	Pro
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Glu	Gln	Ile	Trp	Asn	Asn	Val	Arg	Glu	Val	Val	Gly	Leu	Ala	Leu	Thr
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Gln	Arg	Glu	Thr	Ala	Val	Val	Trp	Asp	Lys	Thr	Thr	Gly	Lys	Pro	Val
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		100						105					110		
Glu	Leu	Gly	Gly	Asp	Glu	Gly	Ala	Glu	Lys	Tyr	Lys	Ser	Ile	Val	Gly
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Leu	Pro	Leu	Ala	Thr	Tyr	Phe	Ser	Gly	Pro	Lys	Ile	Lys	Trp	Ile	Leu
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Asp	Asn	Val	Glu	Gly	Ala	Arg	Glu	Lys	Ala	Glu	Lys	Gly	Asp	Leu	Leu
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Phe	Gly	Asn	Thr	Asp	Thr	Trp	Val	Leu	Trp	Asn	Met	Thr	Gly	Gly	Thr
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Glu	Gly	Gly	Val	His	Val	Thr	Asp	Val	Thr	Asn	Ala	Ser	Arg	Thr	Met
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Leu Met Asp Leu Asp Thr Leu Ser Trp Arg Glu Asp Ile Ala Ala Asp
 195 200 205
 Met Gly Ile Pro Leu Ser Met Leu Pro Asp Ile Arg Ser Ser Ser Glu
 210 215 220
 Val Tyr Gly His Gly Arg Pro Arg Gly Leu Val Pro Gly Val Pro Ile
 225 230 235 240
 Ala Gly Ile Leu Gly Asp Gln Gln Ala Ala Thr Phe Gly Gln Ala Cys
 245 250 255
 Phe Glu Val Gly Gln Ala Lys Asn Thr Tyr Gly Thr Gly Asn Phe Leu
 260 265 270
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 Thr Thr Val Cys Tyr Lys Ile Gly Asp Ala Pro Ala Val Tyr Ala Leu
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 Glu Gly Ser Ile Ala Val Thr Gly Ser Leu Val Gln Trp Leu Arg Asp
 305 310 315 320
 Asn Leu Gly Met Phe Glu Asp Ala Pro Asp Val Glu Trp Leu Ala Gly
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 Lys Val Gln Asp Asn Gly Gly Ala Tyr Phe Val Pro Ala Phe Ser Gly
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 385 390 395 400
 Ser Gly Val Asp Leu Thr Glu Leu Arg Val Asp Gly Gly Met Val Ala
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 Asn Glu Leu Leu Met Gln Phe Gln Ala Asp Gln Leu Gly Val Asp Val
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 Val Arg Pro Lys Val Ala Glu Thr Thr Ala Leu Gly Ala Ala Tyr Ala
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 Ala Gly Ile Ala Val Gly Phe Trp Lys Gly Glu Gln Asp Val Ile Asp
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 Asn Trp Ala Glu Asp Lys Arg Trp Ser Pro Ser Met Glu Ser Gly Glu
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<213> Cellulomonas sp. JCM2471

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48

gcc atc gtc ttc aac cac tcc ggg gag atc tac tcc acc ggg cag ctc
 Ala Ile Val Phe Asn His Ser Gly Glu Ile Tyr Ser Thr Gly Gln Leu

96

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gag cag atc tgg aac aac gtg cgc gag gtc gtc ggt ctc gcc ctc acc Glu Gln Ile Trp Asn Asn Val Arg Glu Val Val Gly Leu Ala Leu Thr 50 55 60			192
cga ggc aac ctc acg cac gag gac atc gcg gcc gtc ggc atc acg aac Arg Gly Asn Leu Thr His Glu Asp Ile Ala Ala Val Gly Ile Thr Asn 65 70 75 80			240
cag cgc gag acg gcc gtc gtc tgg gac aag acc acg ggc aag ccc gtc Gln Arg Glu Thr Ala Val Val Trp Asp Lys Thr Thr Gly Lys Pro Val 85 90 95			288
tac aac gcc atc gtc tgg cag gac acg cgc acc cag aag atc gtc gac Tyr Asn Ala Ile Val Trp Gln Asp Thr Arg Thr Gln Lys Ile Val Asp 100 105 110			336
gag ctc ggc ggc gac gag ggc gcc gag aag tac aag tcg atc gtc ggc Glu Leu Gly Gly Asp Glu Gly Ala Glu Lys Tyr Lys Ser Ile Val Gly 115 120 125			384
ctg ccg ctc gcc acc tac ttc tcc ggc ccg aag atc aag tgg atc ctc Leu Pro Leu Ala Thr Tyr Phe Ser Gly Pro Lys Ile Lys Trp Ile Leu 130 135 140			432
gac aac gtc gag ggt gcg cgc gag aag gcc gag aag ggc gac ctg ctg Asp Asn Val Glu Gly Ala Arg Glu Lys Ala Glu Lys Gly Asp Leu Leu 145 150 155 160			480
ttc ggc aac acc gac acg tgg gtg ctg tgg aac atg acg ggc ggc acc Phe Gly Asn Thr Asp Thr Trp Val Leu Trp Asn Met Thr Gly Gly Thr 165 170 175			528
gag ggc ggc gtg cac gtc acc gac gtg acc aac gcg tcg cgc acg atg Glu Gly Gly Val His Val Thr Asp Val Thr Asn Ala Ser Arg Thr Met 180 185 190			576
ctc atg gac ctc gac acg ctc tcc tgg cgc gag gac atc gcc gcc gac Leu Met Asp Leu Asp Thr Leu Ser Trp Arg Glu Asp Ile Ala Ala Asp 195 200 205			624
atg ggc atc ccg ctg tcg atg ctc ccc gac atc cgg tcg tcg tcc gag Met Gly Ile Pro Leu Ser Met Leu Pro Asp Ile Arg Ser Ser Ser Glu 210 215 220			672
gtc tac ggc cac ggg cgc ccg cgc ggc ctc gtc ccc ggc gtc ccg atc Val Tyr Gly His Gly Arg Pro Arg Gly Leu Val Pro Gly Val Pro Ile 225 230 235 240			720
gcc ggc atc ctc ggc gac cag cag gca gcc acg ttc ggc cag gcg tgc Ala Gly Ile Leu Gly Asp Gln Gln Ala Ala Thr Phe Gly Gln Ala Cys 245 250 255			768

ttc gag gtc ggc cag gcc aag aac acc tac ggc acc ggc aac ttc ctg Phe Glu Val Gly Gln Ala Lys Asn Thr Tyr Gly Thr Gly Asn Phe Leu 260 265 270	816
ctg ctc aac acg ggc acg gag aag gtc atg agc aag aac ggc ctg ctc Leu Leu Asn Thr Gly Thr Glu Lys Val Met Ser Lys Asn Gly Leu Leu 275 280 285	864
acg acg gtc tgc tac aag atc ggc gac gcg ccc gcg gtg tac gcg ctc Thr Thr Val Cys Tyr Lys Ile Gly Asp Ala Pro Ala Val Tyr Ala Leu 290 295 300	912
gag ggc tcg atc gcc gtg acc ggc tcg ctc gtg cag tgg ctg cgc gac Glu Gly Ser Ile Ala Val Thr Gly Ser Leu Val Gln Trp Leu Arg Asp 305 310 315 320	960
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ctg ttc gcg ccc tac tgg cgg ccc gac gcg cgc ggc gcg ctc gtc ggc Leu Phe Ala Pro Tyr Trp Arg Pro Asp Ala Arg Gly Ala Leu Val Gly 355 360 365	1104
ctc acg cgg tac gtc aac cgc aac cac atc gcg cgc gcc gcg ctc gag Leu Thr Arg Tyr Val Asn Arg Asn His Ile Ala Arg Ala Ala Leu Glu 370 375 380	1152
gcg acg gcg ttc cag agc cgc gag gtc gtc gac gcg atg aac gcc gac Ala Thr Ala Phe Gln Ser Arg Glu Val Val Asp Ala Met Asn Ala Asp 385 390 395 400	1200
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aac gag ctc ctc atg cag ttc cag gcc gac cag ctc ggc gtc gac gtc Asn Glu Leu Leu Met Gln Phe Gln Ala Asp Gln Leu Gly Val Asp Val 420 425 430	1296
gtg cgg ccc aag gtc gcc gag acg acg gcg ctc ggt gcc gcg tac gcc Val Arg Pro Lys Val Ala Glu Thr Thr Ala Leu Gly Ala Ala Tyr Ala 435 440 445	1344
gcg ggc atc gcc gtc ggc ttc tgg aag ggc gag cag gac gtc atc gac Ala Gly Ile Ala Val Gly Phe Trp Lys Gly Glu Gln Asp Val Ile Asp 450 455 460	1392
aac tgg gcc gag gac aag cgc tgg agc ccg tcg atg gag tcc ggc gag Asn Trp Ala Glu Asp Lys Arg Trp Ser Pro Ser Met Glu Ser Gly Glu 465 470 475 480	1440

cgc gag cgg ctg tac cgc aac tgg aag aag gcc gtg acg aag acg atg	1488
Arg Glu Arg Leu Tyr Arg Asn Trp Lys Lys Ala Val Thr Lys Thr Met	
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